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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/730,527	12/08/2003	Junaid Ahmed Siddiqui	06354ZP USA	2963

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AIR PRODUCTS AND CHEMICALS, INC.
PATENT DEPARTMENT
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EXAMINER

MARCHESCHI, MICHAEL A

ART UNIT	PAPER NUMBER
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1755

DATE MAILED: 03/01/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/730,527

Applicant(s)

SIDDIQUI, JUNAID AHMED

Examiner

Michael A Marcheschi

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☐ This action is FINAL. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☐ Claim(s) 1-16 is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☒ Claim(s) 1-16 is/are rejected.
- 7) ☐ Claim(s) ____ is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on ____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on ____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☒ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. ____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449) Paper No(s) 12/8/03
- 4) ☐ Interview Summary (PTO-413) Paper No(s). ____
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: ____

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The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1-16 are rejected under 35 U.S.C. 103(a) as obvious over Streinz et al. (686) in view of either (1) Smith et al. or (2) McCutcheon's Volume 1: Emulsifiers and Detergents (cited by applicants).

Streinz et al. teach in the abstract, column 4, line 25-column 7, line 60, a polishing composition which comprises an abrasive (silica), a fluoride salt (ammonium fluoride) and a surfactant. Example 1 shows that a colloidal abrasive is used. The composition is used to polish substrates that contain dielectrics.

McCutcheon's Volume 1: Emulsifiers and Detergents (cited by applicants) teaches in the entire document that the claimed specific diol is a known nonionic surfactant.

Smith et al. teach in column 5, lines 51-53 that the claimed specific diol is a well known nonionic surfactant.

The primary reference teaches a composition that contains the claimed components a) and b). With respect to claimed component "c)", the primary reference teaches that a surfactant can be added (surfactant is not limited and can be a nonionic surfactant). The claimed diol(s) is (are) well known nonionic surfactants, as is clearly shown by the two secondary references and therefore the use thereof is well within the level of ordinary skill in the art because the primary

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reference implies that any nonionic surfactant can be used. The primary reference teaches nonionic surfactants, in general, and this also makes obvious the claimed material because “**A generic disclosure renders a claimed species prima facie obvious. *Ex parte George* 21 USPQ 2d 1057, 1060 (BPAI 1991); *In re Woodruff* 16 USPQ 2d 1934; *Merk & Co. v. Biocraft Lab. Inc.* 10 USPQ 2d 1843 (Fed. Cir. 1983); *In re Susi* 169 USPQ 423 (CCPA 1971)**”. The use of any nonionic surfactant is obvious to the skilled artisan, especially known nonionic surfactants, as shown by the secondary references. Although the primary reference does not literally state that colloidal silica is used, this aspect is obvious because (1) as can be seen from the size of the silica (less than 0.4 microns), it can be colloidal in size, thus reading on colloidal silica and (2) example 1 defines that the abrasive is colloidal. Although the example uses colloidal alumina, it is the examiners position that this example teaches that colloidal abrasive can be used and the skilled artisan would have known that this would also apply to other abrasives (silica) absent evidence to the contrary. The examiner acknowledges that Smith et al. is not related to the subject matter of the primary reference (CMP) but the examiner has only used this reference to establish that the claimed diol is a known nonionic surfactant.

Claims 1-16 are rejected under 35 U.S.C. 103(a) as obvious over Misra et al. in view of either (1) Smith et al. or (2) McCutcheon's Volume 1: Emulsifiers and Detergents (cited by applicants).

Misra et al. teach in column 3, lines 30-57, column 5, lines 25-40 and column 6, lines 30-35, a polishing composition which comprises an abrasive (colloidal silica), ammonium fluoride

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and a surfactant. An example of a surfactant is of the SURFYNOL type (i.e. nonionic surfactant). The composition is used to polish substrates that contain dielectrics.

The primary reference teaches a composition that contains the claimed components a) and b). With respect to claimed component “c)”, the primary reference teaches that a surfactant can be added (an example of a surfactant is defined and this being a nonionic surfactant-SURFYNOL). The claimed diol(s) is (are) well known nonionic surfactants, as is clearly shown by the two secondary references and therefore the use thereof is well within the level of ordinary skill in the art because the primary reference implies that type of SURFYNOL (nonionic surfactants) can be used (i.e. the reference is not limited to the specific nonionic surfactant defined because this is a mere example). The primary reference teaches SURFYNOL surfactants (nonionic surfactants), in general, and this also makes obvious the claimed material because “**A generic disclosure renders a claimed species prima facie obvious. *Ex parte George* 21 USPQ 2d 1057, 1060 (BPAI 1991); *In re Woodruff* 16 USPQ 2d 1934; *Merk & Co. v. Biocraft Lab. Inc.* 10 USPQ 2d 1843 (Fed. Cir. 1983); *In re Susi* 169 USPQ 423 (CCPA 1971)**”. The use of any nonionic surfactant is obvious to the skilled artisan, especially known SURFYNOL (nonionic) surfactants, as shown by the secondary references. **The substitution of on known SURFYNOL (nonionic) surfactant for another is well within the level of ordinary skill in the art. In addition, the primary reference teaches the use of SURFYNOL and this is of the nonionic type. In view of this, the use of any nonionic SURFYNOL surfactant is well within the level of ordinary skill in the art. Finally, the primary reference teaches a SURFYNOL surfactant, and it is the examiners position that this surfactant meets the alcohol imitation of claims 1, 2, 4 and 5.** The examiner acknowledges that Smith et al. is not

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related to the subject matter of the primary reference (CMP) but the examiner has only used this reference to establish that the claimed diol is a known nonionic surfactant.

The examiner acknowledges the results defined in the instant specification, but these results are based on the combination of a specific fluoride and a specific alcohol (diol) and therefore any showing of synergism or unexpected results for this combination is not consistent with the broad claims.

In view of the teachings as set forth above, it is the examiners position that the references reasonably teach or suggest the limitations of the rejected claims.

"A reference is good not only for what it teaches but also for what one of ordinary skill might reasonably infer from the teachings. *In re Opprecht* 12 USPQ 2d 1235, 1236 (CAFC 1989); *In re Bode* USPQ 12; *In re Lamberti* 192 USPQ 278; *In re Bozek* 163 USPQ 545, 549 (CCPA 1969); *In re Van Mater* 144 USPQ 421; *In re Jacoby* 135 USPQ 317; *In re LeGrice* 133 USPQ 365; *In re Preda* 159 USPQ 342 (CCPA 1968)". In addition, "A reference can be used for all it realistically teaches and is not limited to the disclosure in its preferred embodiments" See *In re Van Marter*, 144 USPQ 421.

"A generic disclosure renders a claimed species prima facie obvious. *Ex parte George* 21 USPQ 2d 1057, 1060 (BPAI 1991); *In re Woodruff* 16 USPQ 2d 1934; *Merk & Co. v. Biocraft Lab. Inc.* 10 USPQ 2d 1843 (Fed. Cir. 1983); *In re Susi* 169 USPQ 423 (CCPA 1971)".

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The subject matter as a whole would have been obvious to one having ordinary skill in the art at the time the invention was made to have selected the overlapping portion of the range disclosed by the reference because overlapping ranges have been held to be a prima facie case of obviousness, see *In re Malagari*, 182 U.S.P.Q. 549; *In re Wertheim* 191 USPQ 90 (CCPA 1976)".

Evidence of unexpected results must be clear and convincing. *In re Lohr* 137 USPQ 548. Evidence of unexpected results must be commensurate in scope with the subject matter claimed. *In re Linder* 173 USPQ 356.

The references cited on the 1449 have been reviewed by the examiner and are considered to be art of interest since they are cumulative to or less than the art relied upon in the above rejections.

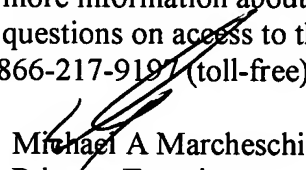
Any foreign language documents submitted by applicant has been considered to the extent of the short explanation of significance, English abstract or English equivalent, if appropriate.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Michael A Marcheschi whose telephone number is (571) 272-1374. The examiner can normally be reached on M-F (8:00-5:30) First Friday Off.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Jerry Lorengo can be reached on (571) 272-1233. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

2/25/05
MM


Michael A Marcheschi
Primary Examiner
AU 1755